

AMENDMENTS TO THE CLAIMS

Please amend the claims as indicated hereafter (where underlining “_” denotes additions and strikethrough “-” denotes deletions).

Claims:

1. (Currently Amended) A method for reducing CPU loading in a software receiver for a packet based communications system comprising the steps of:

measuring the current CPU load;

determining that whether the CPU load has exceeded a predetermined threshold;

responsive to determining that the CPU has exceeded a predetermined threshold, entering a power save mode, thereby signaling the communications system transmitter to inhibit packet transmission ~~when the threshold is exceeded;~~

monitoring the CPU load while the transmitter is inhibited;

determining that the CPU load has fallen below a predetermined threshold; and

signaling the communications system transmitter to begin transmitting packets once the CPU load has fallen below the predetermined threshold.

2. (Original) A method as in claim 1, wherein the measurement of CPU loading is made by an operating system background task.

3. (Original) A method as in claim 1, wherein the CPU load measurement is based on the response time of the host CPU to a request for interrupt.

4. (Currently Amended) A method as in claim 1, wherein the transmitter signaling is ~~done through a~~ performed during the power save mode.

5. (Original) A method as in claim 1, in which the communications system is wireless.

6. (Original) A method as in claim 1, in which the communications system is IEEE 802.11 wireless local area network (WLAN).

7. (Original) A method as in claim 1, in which the communication system is Bluetooth.

8. (Original) A method as in claim 1, in which the communications system is IEEE 802.15 wireless personal area network (PAN).

9.-14. (Canceled).

15. (New) An apparatus for reducing CPU loading in a software receiver for a packet based communications system comprising:

digital logic configured to:

measure the current CPU load;

determine whether the CPU load has exceeded a predetermined threshold;

responsive to determining that the CPU has exceeded a predetermined threshold, enter a power save mode, thereby signaling the communications system transmitter to inhibit packet transmission;

monitor the CPU load while the transmitter is inhibited;

determine whether the CPU load has fallen below a predetermined threshold; and

signal the communications system transmitter to begin transmitting packets once the CPU load has fallen below the predetermined threshold.

16. (New) The apparatus of claim 15, wherein the measurement of CPU loading is a background task.

17. (New) The apparatus of claim 15, wherein the CPU load measurement is based on the response time of a host CPU to a request for interrupt.

18. (New) The apparatus of claim 15, wherein the transmitter signaling is performed during the power save mode.

19. (New) The apparatus of claim 15, wherein the communications system is wireless.

20. (New) The apparatus of claim 15, wherein the communications system is at least one of: an IEEE 802.11 wireless local area network (WLAN); a Bluetooth system; and an IEEE 802.15 wireless personal area network (PAN).

21. (New) A system for reducing CPU loading in a software receiver for a packet based communications system comprising:

means for measuring the current CPU load;

means for determining whether the CPU load has exceeded a
predetermined threshold;

means for, responsive to determining that the CPU has exceeded a
predetermined threshold, entering a power save mode, thereby
signaling the communications system transmitter to inhibit packet
transmission;

means for monitoring the CPU load while the transmitter is inhibited;

means for determining that the CPU load has fallen below a
predetermined threshold; and

means for signaling the communications system transmitter to begin
transmitting packets once the CPU load has fallen below the
predetermined threshold.

22. (New) The system of claim 21, wherein the measurement of CPU loading is made as a background task.

23. (New) The system of claim 21, wherein the CPU load measurement is based on the response time of the host CPU to a request for interrupt.

24. (New) The system of claim 21, wherein the transmitter signaling is performed during the power save mode.

25. (New) The system of claim 21, wherein the communications system is wireless.

26. (New) The system of claim 21, wherein the communications system is at least one of: an IEEE 802.11 wireless local area network (WLAN); a Bluetooth system; and an IEEE 802.15 wireless personal area network (PAN).